

SECTION 3.2

Dulles Airport

SECTION 3.2

DATA PRESENTATION

The following section contains the tables, site photos, and spectrum photos pertaining to the site location measured.

3.2 XM Radio – Dulles Airport

- o Table 3.2-1 presents a site data sheet including all pertinent site information.
- o Figure 3.2-1 contains topographic map denoting the test location throughout the measurements.
- o Figures 3.2-2 are the photographs depicting the test site.
- o Figures 3.2-3 through 3.2-4 are the RF spectrum photographs depicting the interference environment at the test site.

TABLE 3.2-1

MEASUREMENT SITE DATA SHEET

1. SYSTEM NAME:	XM Radio
2. CITY AND STATE:	Dulles, VA
3. SITE IDENTIFICATION:	Dulles Airport
4. COORDINATES: (NAD 1983)	LATITUDE: 38° 58' 21.5" N LONGITUDE: 77° 26' 56.3" W
5. SITE TYPE:	Suburban
6. MEASUREMENT DATES & TIMES:	January 17, 2002 1400-1500 January 21, 2002 1230-1330

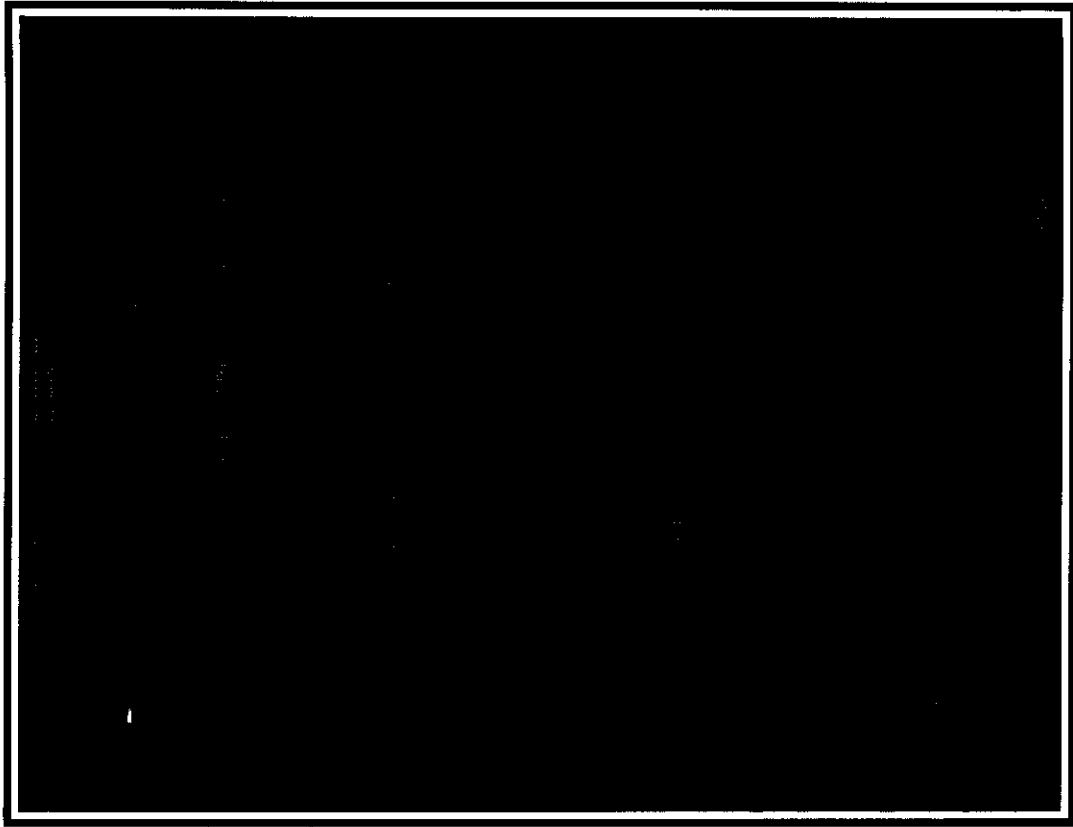


XM RADIO

FIGURE 3.2-1



North



East

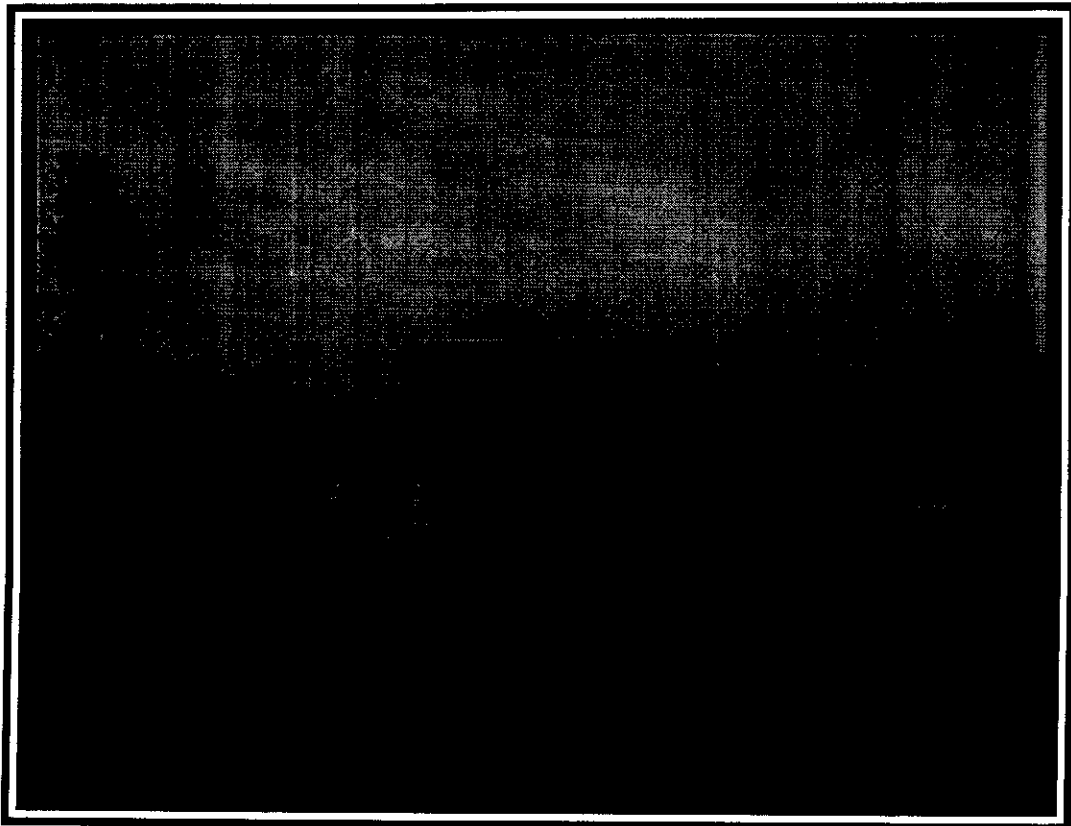
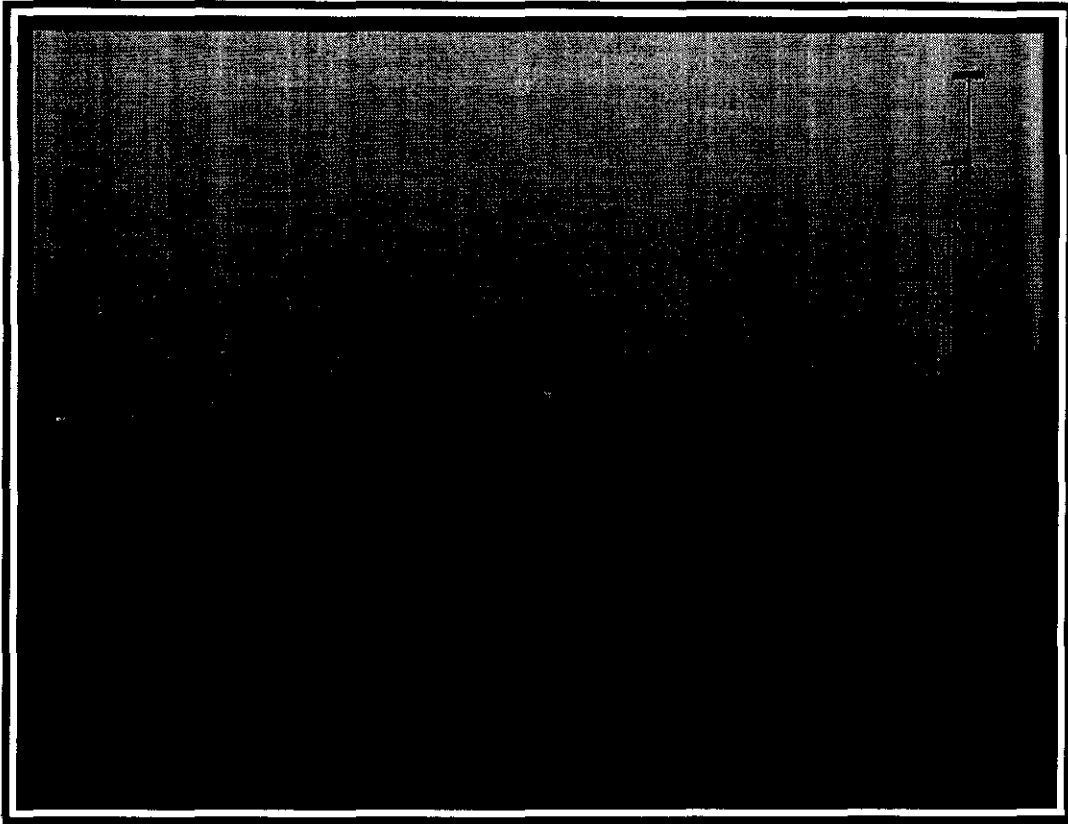


Figure 3.2-2 Measurement Site Photographs

South



West

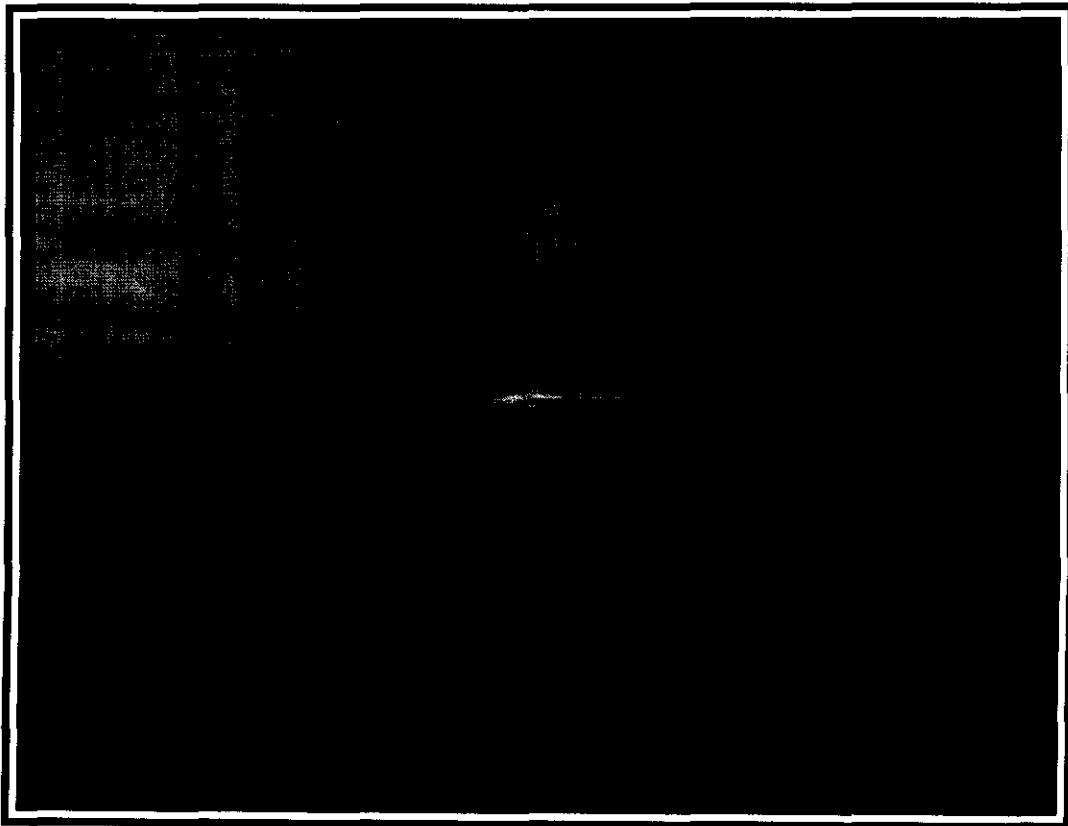
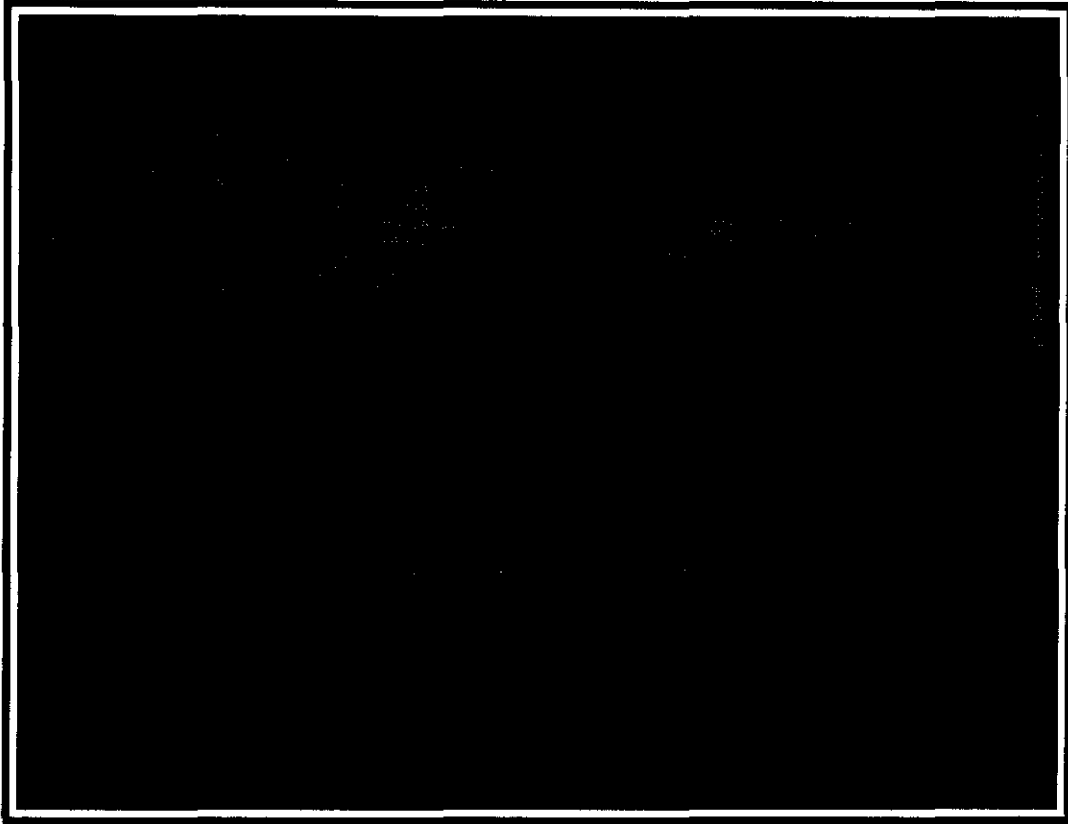


Figure 3.2-2 (cont.) Measurement Site Photographs

Az 128°



Az 189°

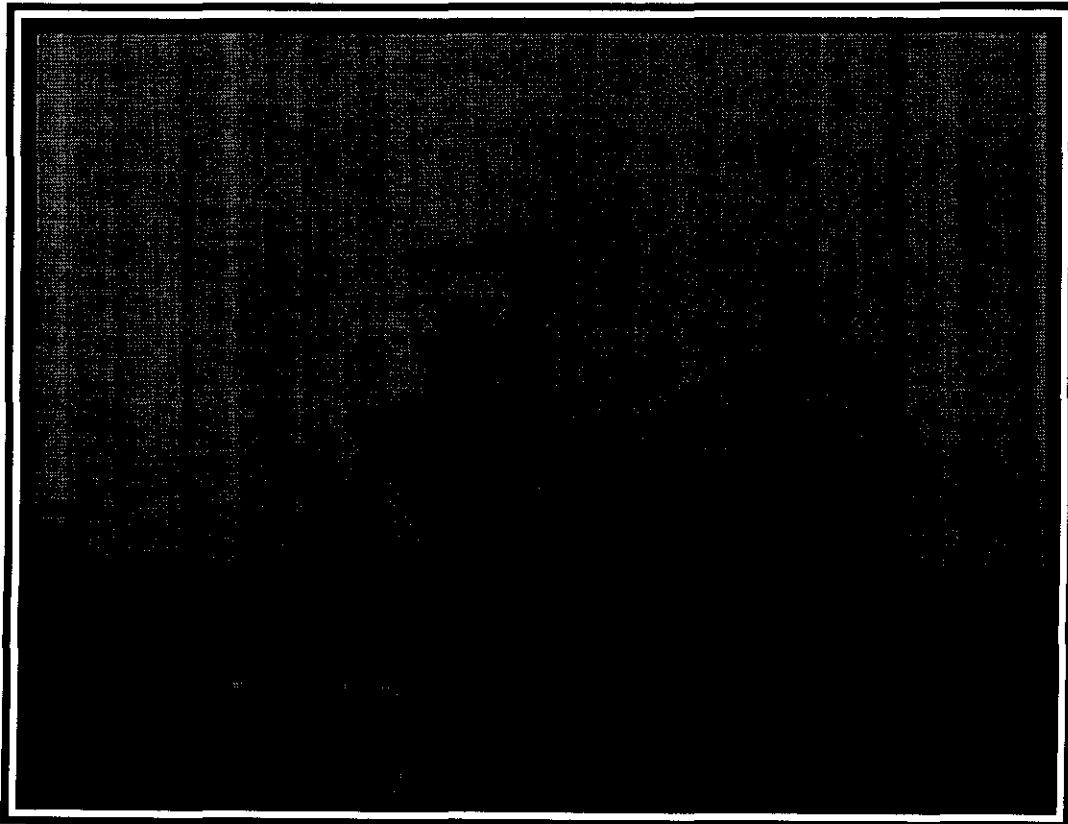


Figure 3.2-2 (cont.) Measurement Site Photographs

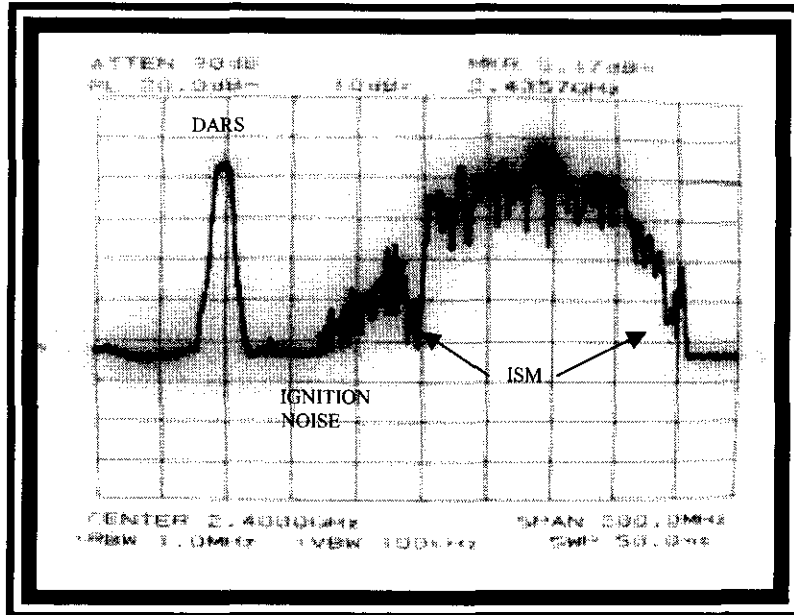
Dulles Airport

Azimuth 189°

XM Radio

Reference
Level
dBW_i

-89.5



With Tunable and High-Pass
Filters

Date: January 17, 2002

Time of Day: 1440

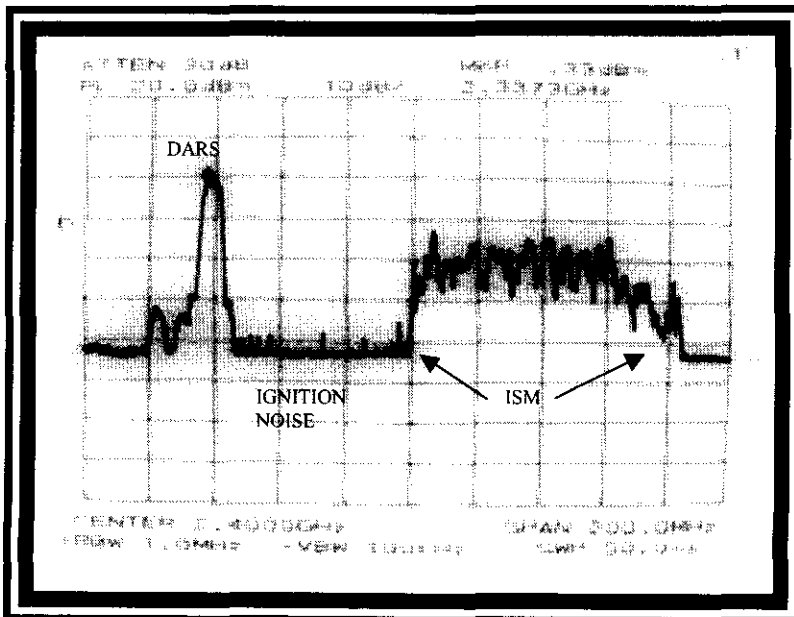
Ant. Polarization: V

Ant. Centerline: 10 Ft.

(A)

Reference
Level
dBW_i

-89.5



Date: January 17, 2002

Time of Day: 1445

Ant. Polarization: H

Ant. Centerline: 10 Ft.

(B)

Figure 3.2-3 RF Spectrum Analysis

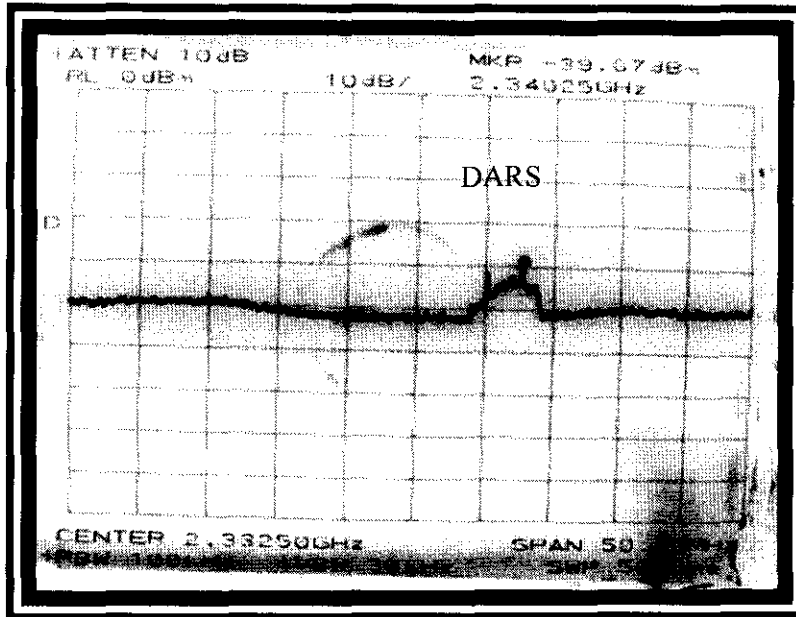
Dulles, Virginia

Reference
Level
dBW_i

XM Radio

Azimuth 0-360°

-107



With High-Pass, Tunable, and
Notch Filters

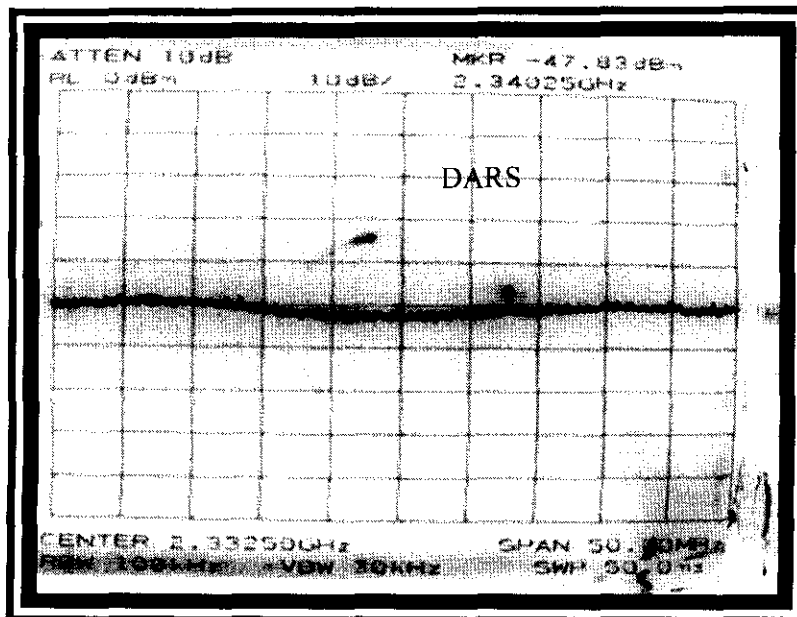
Date: January 21, 2002
Time of Day: 1235
Ant. Polarization: V
Ant. Centerline: 10 Ft.

Full Antenna Sweep

(A)

Reference
Level
dBW_i

-107



Date: January 21, 2002
Time of Day: 1240
Ant. Polarization: H
Ant. Centerline: 10 Ft.

Full Antenna Sweep

(B)

Figure 3.2-4 RF Spectrum Analysis

SECTION 3.3

Reston, VA

SECTION 3.3

DATA PRESENTATION

The following section contains the tables, site photos, and spectrum photos pertaining to the site location measured.

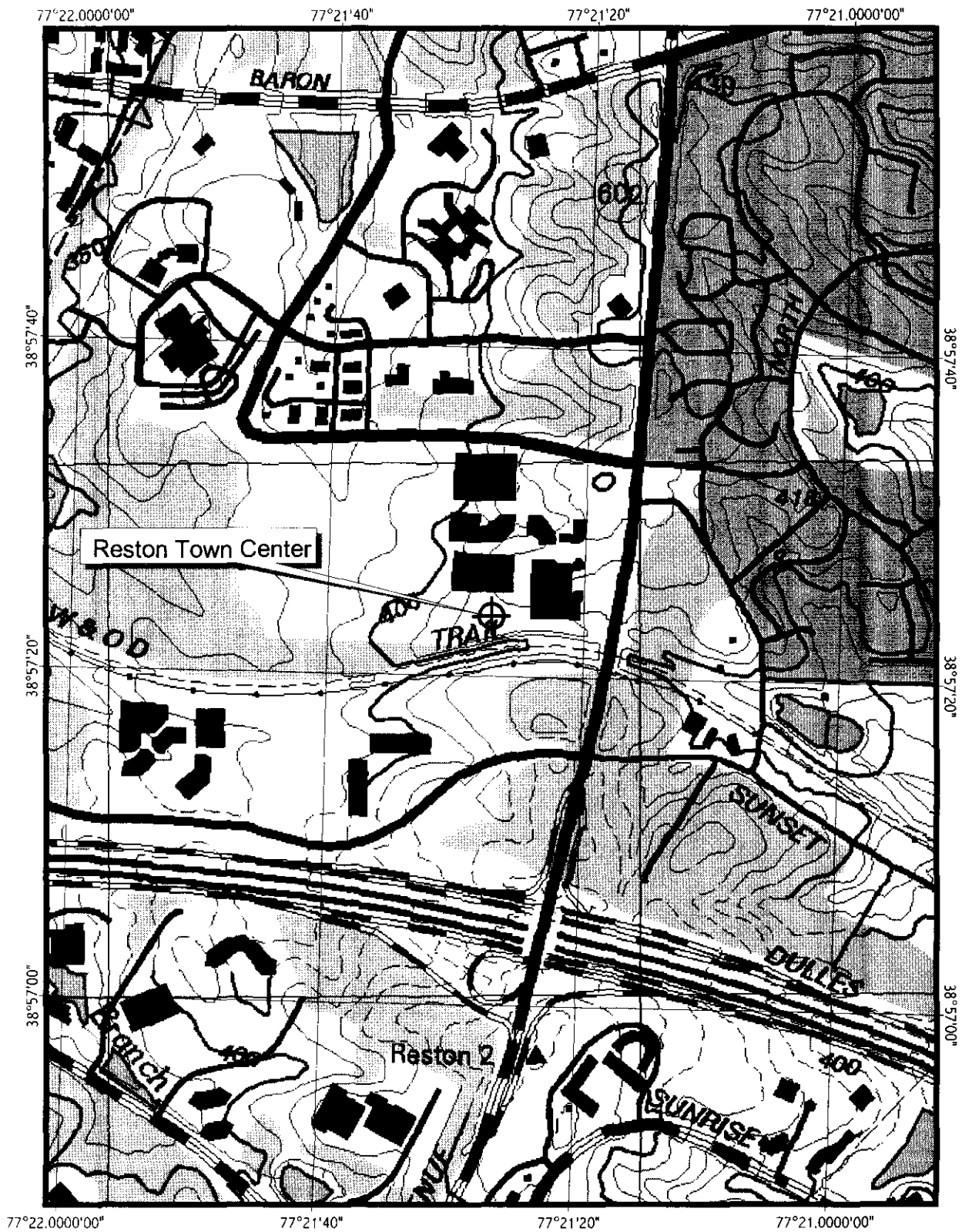
3.3 XM Radio – Reston, VA

- o Table 3.3-1 presents a site data sheet including all pertinent site information.
- o Figure 3.3-1 contains topographic map denoting the test location throughout the measurements.
- o Figures 3.3-2 are the photographs depicting the test site.
- o Figures 3.3-3 through 3.3-4 are the RF spectrum photographs depicting the interference environment at the test site.

TABLE 3.3-1

MEASUREMENT SITE DATA SHEET

- | | |
|-------------------------------|--|
| 1. SYSTEM NAME: | XM Radio |
| 2. CITY AND STATE: | Reston, VA |
| 3. SITE IDENTIFICATION: | Reston Town Center |
| 4. COORDINATES:
(NAD 1983) | LATITUDE: 38° 57' 27.2" N
LONGITUDE: 77° 21' 27.2" W |
| 5. Site Type: | Urban |
| 6. MEASUREMENT DATES & TIMES: | January 17, 2002 1730-1830
January 18, 2002 1430-1515 |

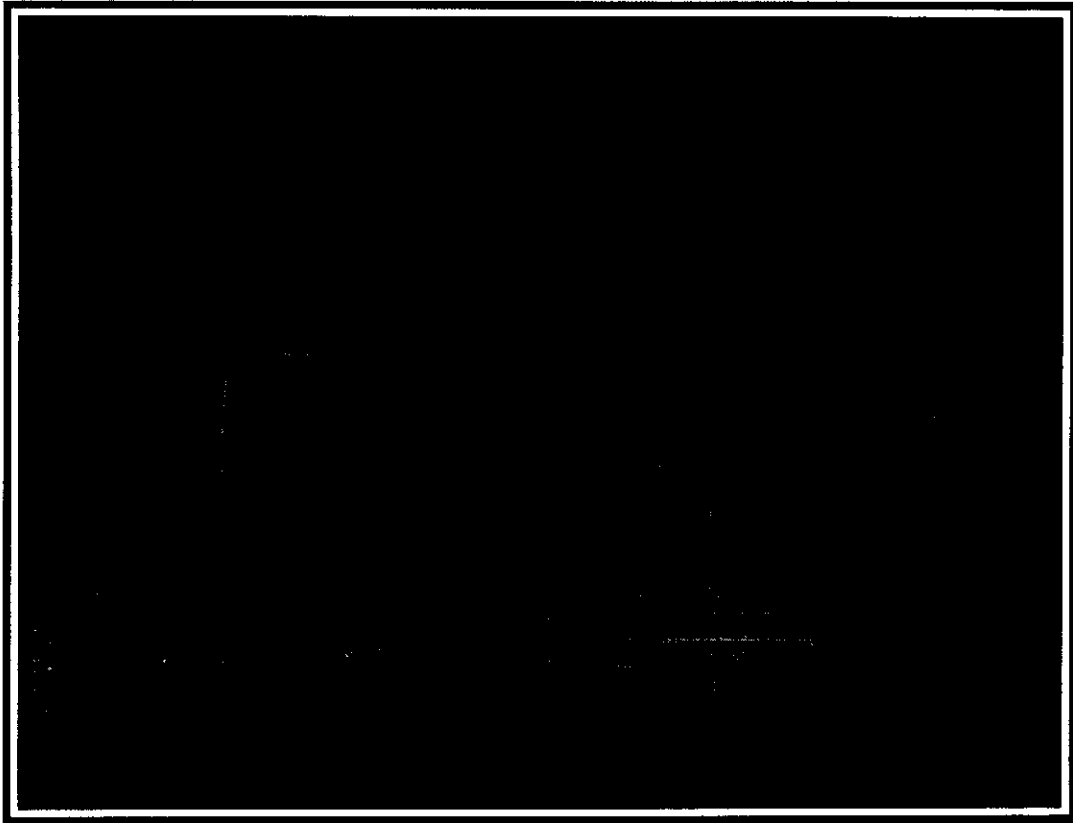


XM RADIO

FIGURE 3.3-1



North



East

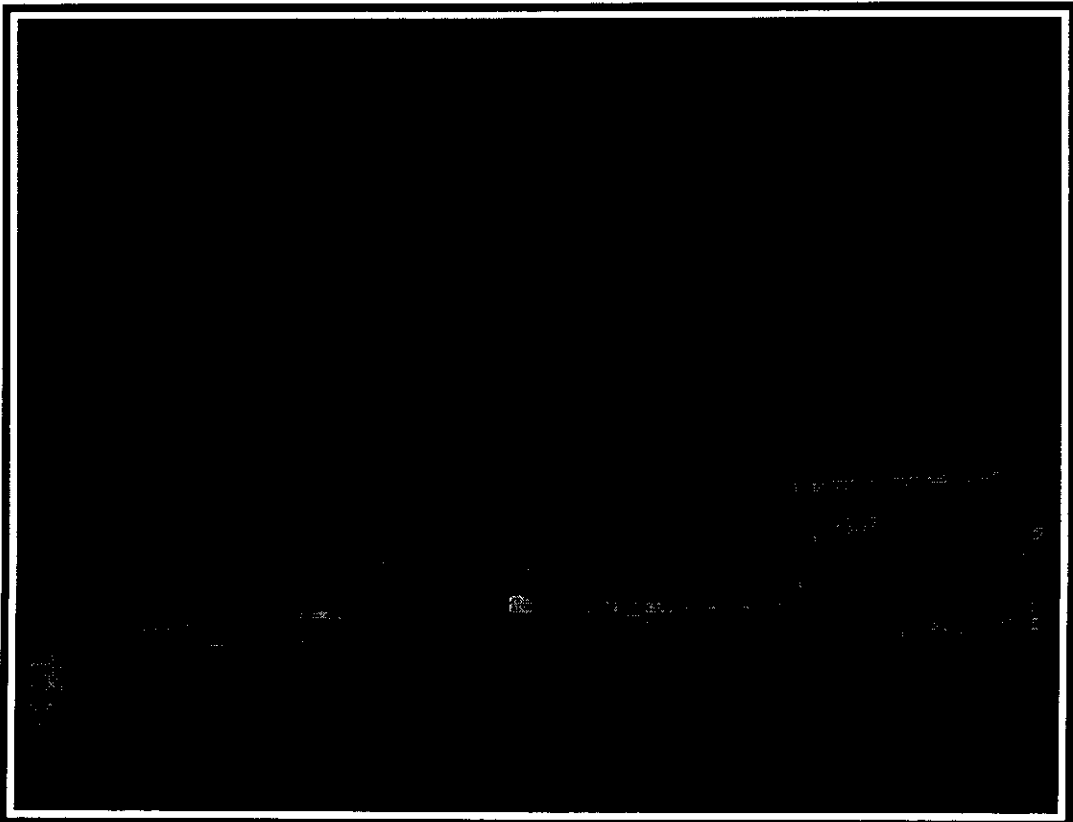
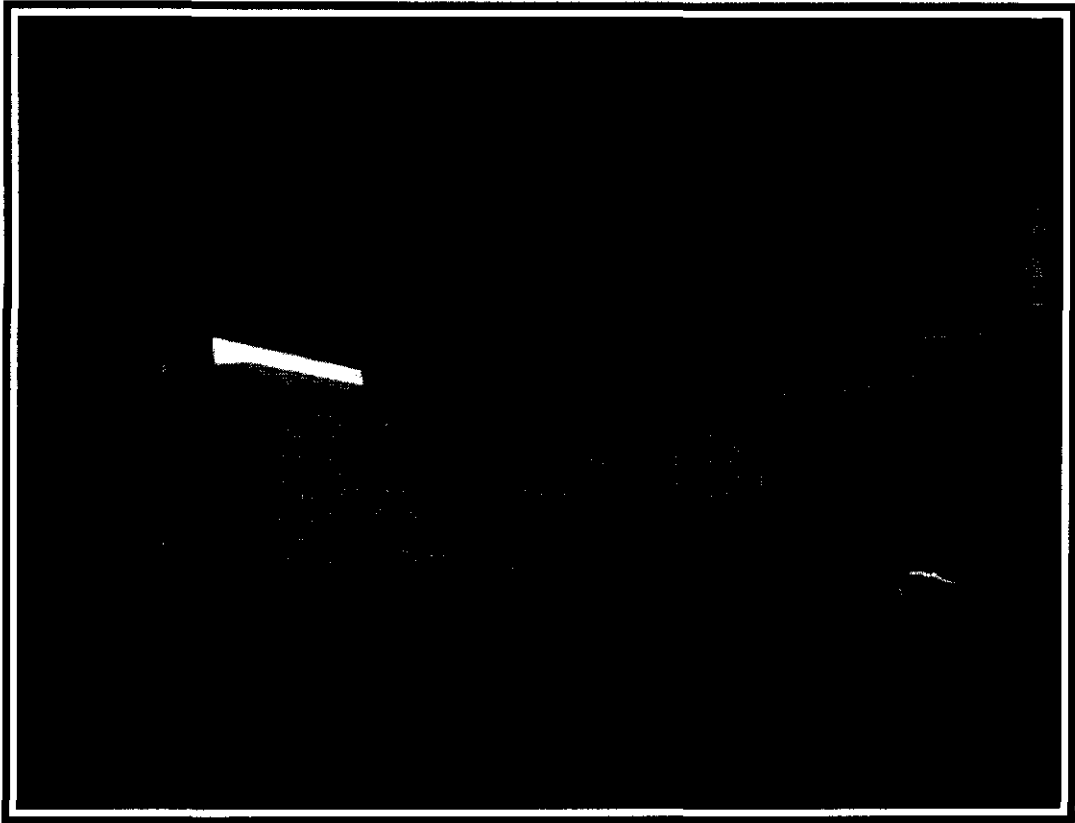


Figure 3.3-2 Measurement Site Photographs

South



West

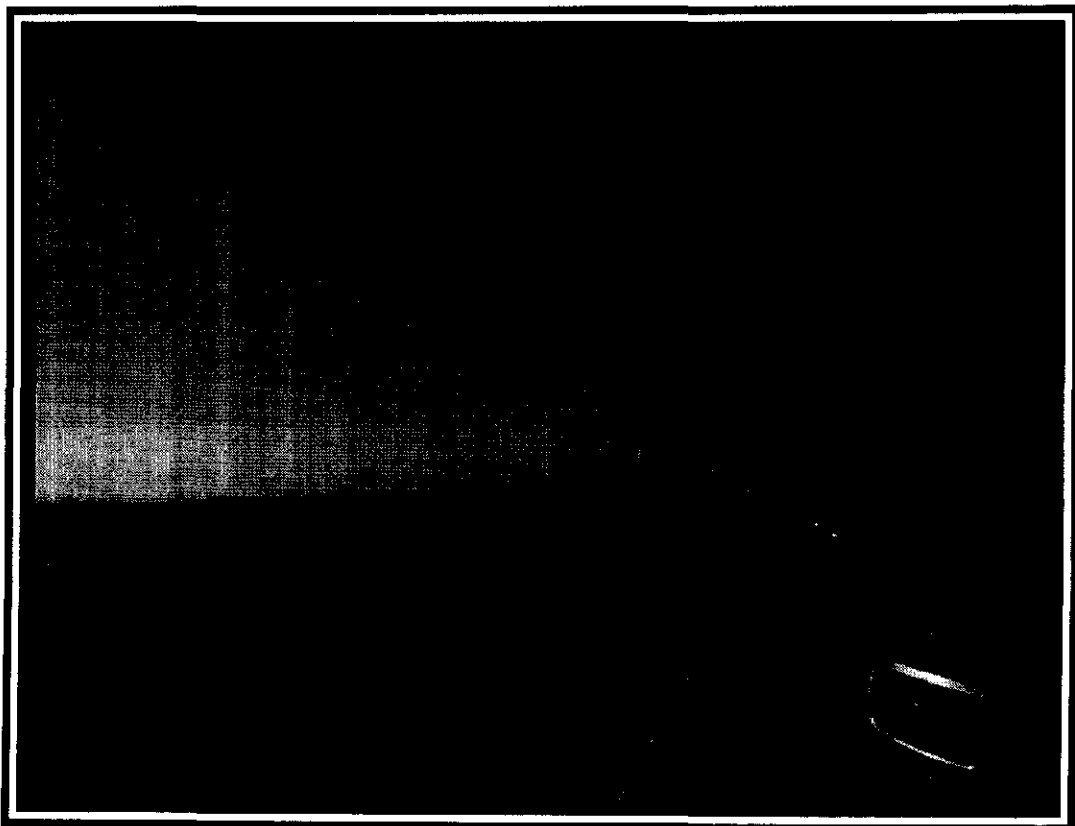
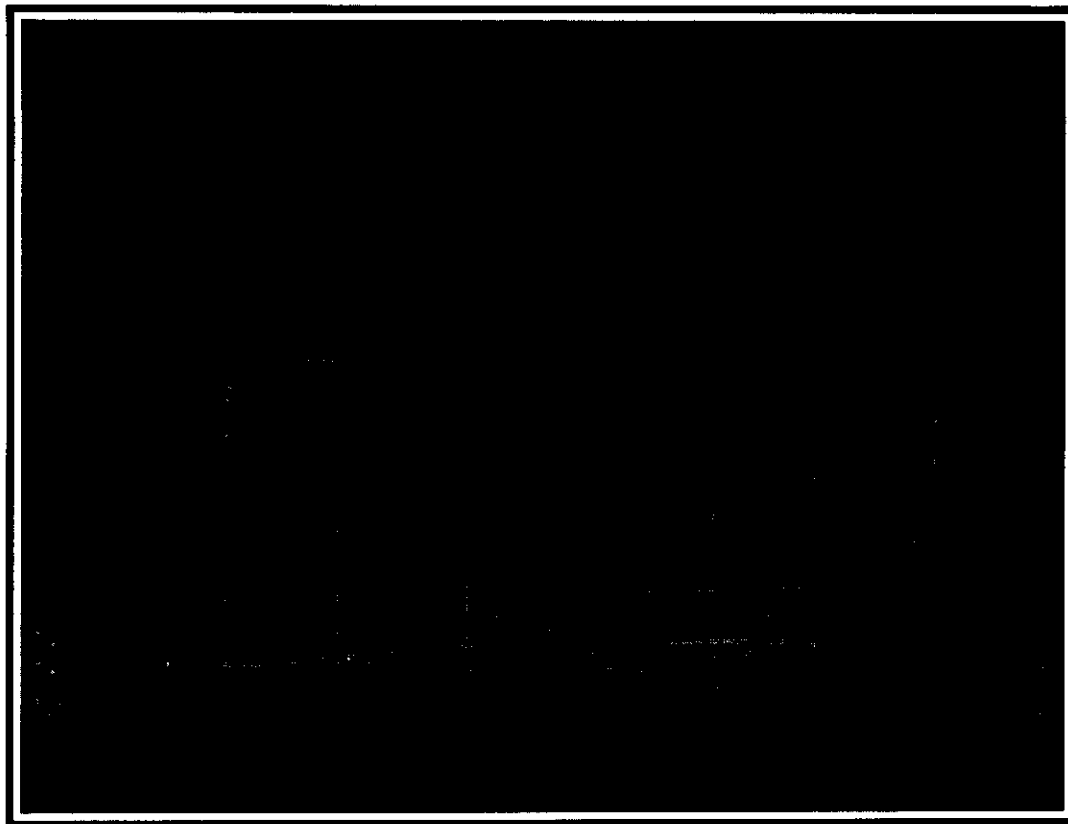


Figure 3.3-2 (cont.) Measurement Site Photographs

Az 41°



Az 166°

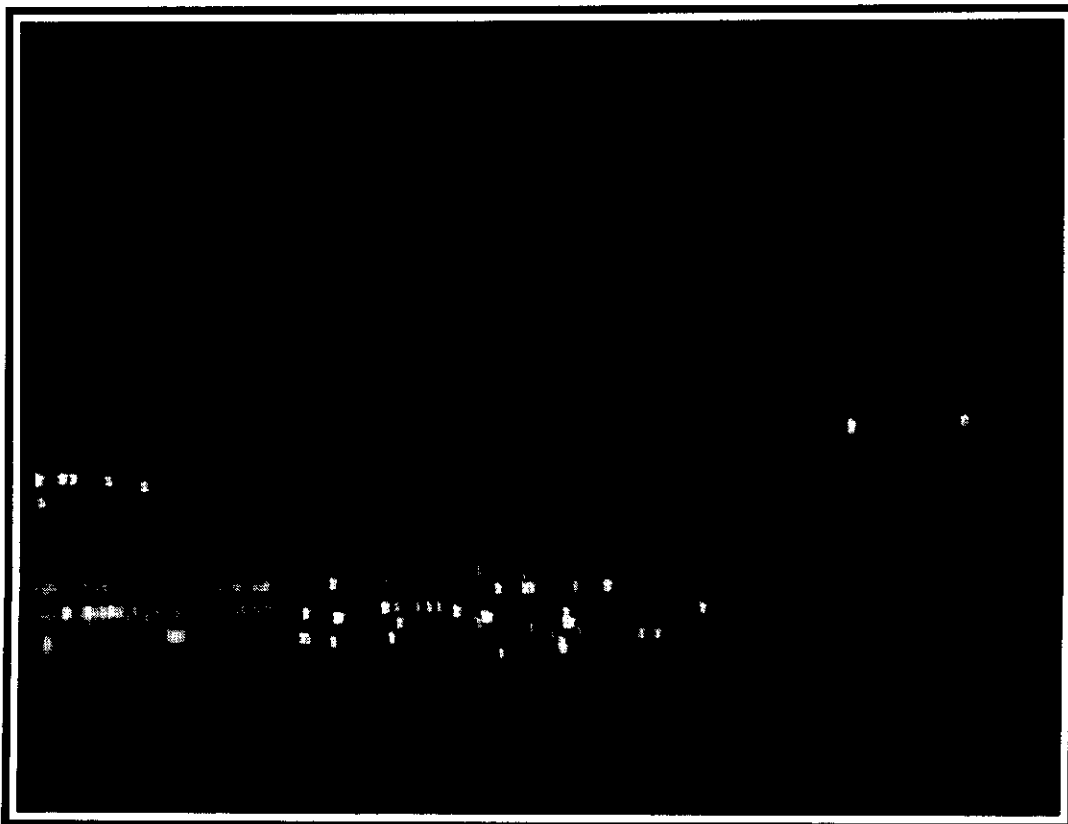


Figure 3.3-2 (cont.) Measurement Site Photographs

Reston, Virginia

Azimuth 0-360°

Reference

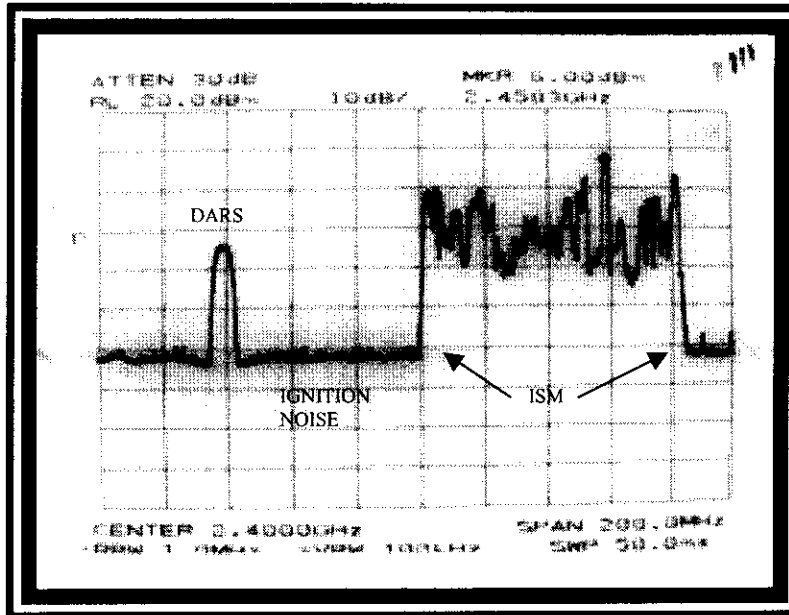
Level

dBW_i

XM Radio

With High-Pass, Tunable and
Notch Filters

-87



Date: January 18, 2002

Time of Day: 1430

Ant. Polarization: V

Ant. Centerline: 10 Ft.

Full Antenna Sweep

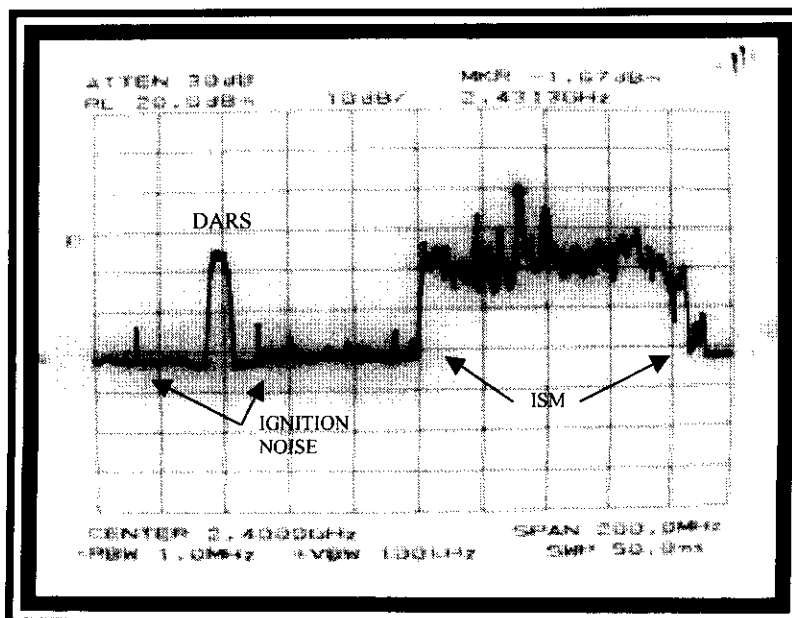
(A)

Reference

Level

dBW_i

-87



Date: January 18, 2002

Time of Day: 1435

Ant. Polarization: H

Ant. Centerline: 10 Ft.

Full Antenna Sweep

(B)

Figure 3.3-3 RF Spectrum Analysis

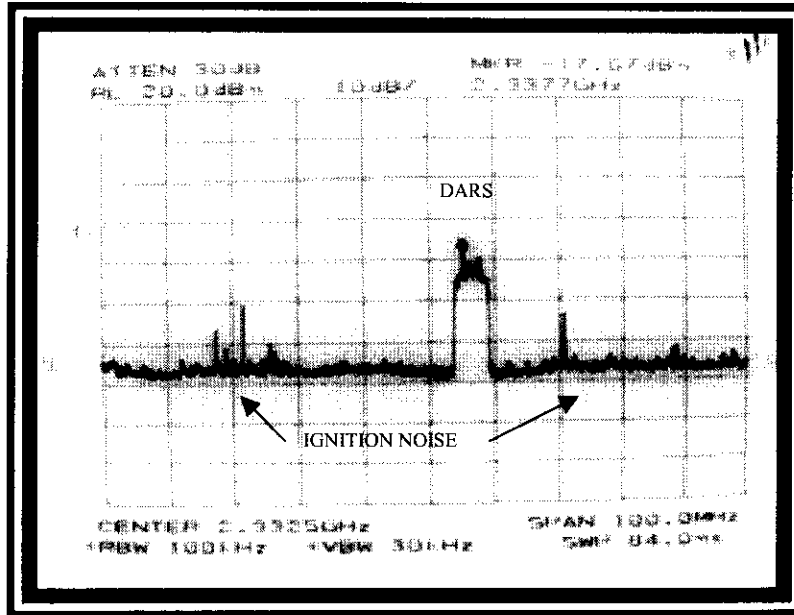
Reston, Virginia

Azimuth 0-360°

Reference
Level
dBW_i

XM Radio

-87



With High-Pass, Tunable, and
Notch Filters

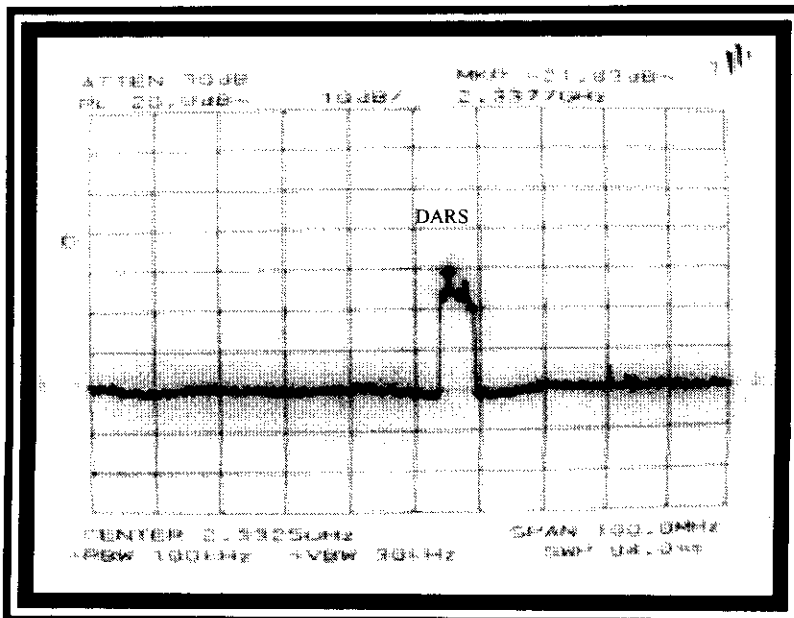
Date: January 18, 2002
Time of Day: 1445
Ant. Polarization: V
Ant. Centerline: 10 Ft.

Full Antenna Sweep

(A)

Reference
Level
dBW_i

-87



Date: January 18, 2002
Time of Day: 1450
Ant. Polarization: H
Ant. Centerline: 10 Ft.

Full Antenna Sweep

(B)

Figure 3.3-4 RF Spectrum Analysis

SECTION 3.4

Vienna, VA

SECTION 3.4

DATA PRESENTATION

The following section contains the tables, site photos, and spectrum photos pertaining to the site location measured.

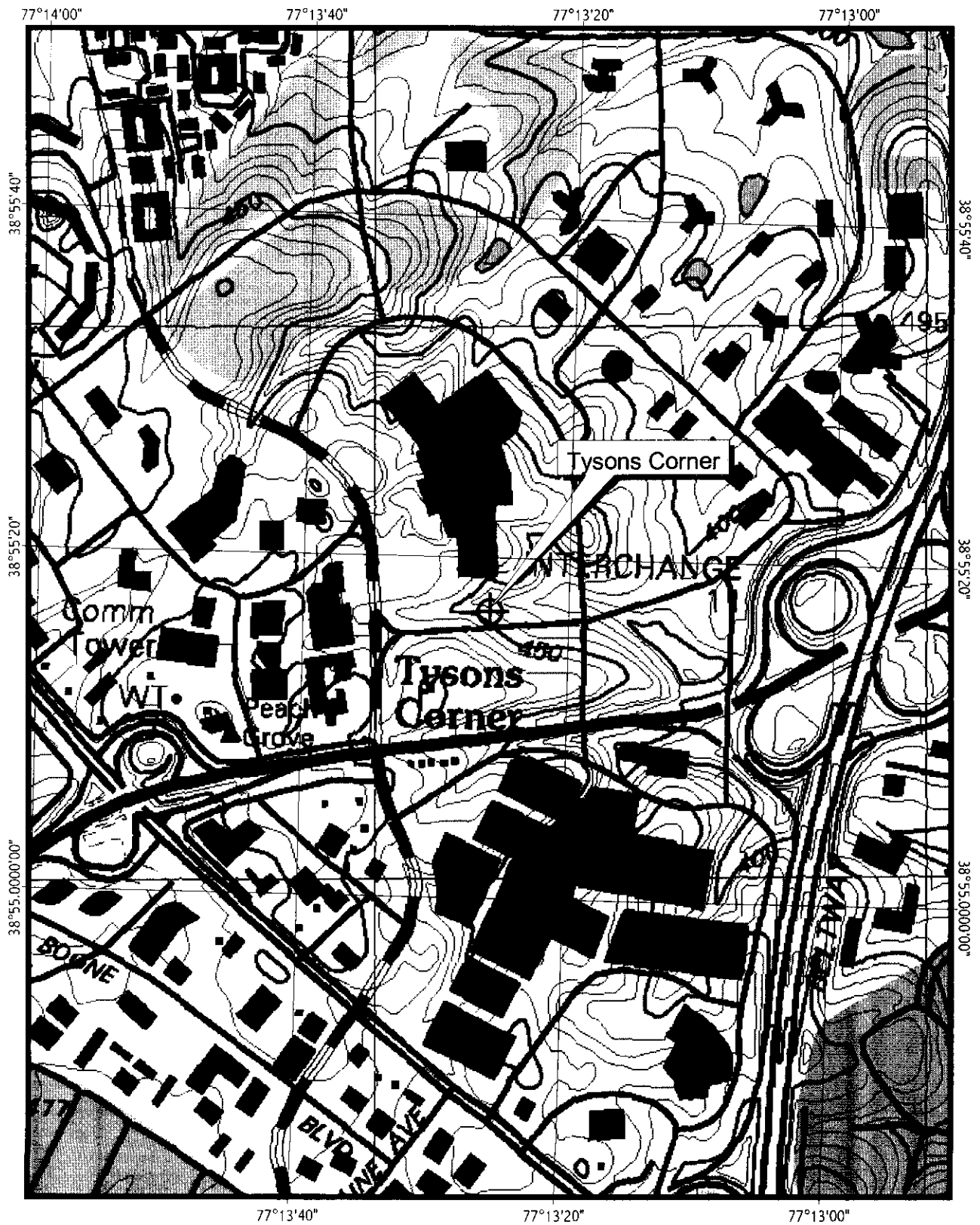
3.4 XM Radio – Vienna, VA

- o Table 3.4-1 presents a site data sheet including all pertinent site information.
- o Figure 3.4-1 contains topographic map denoting the test location throughout the measurements.
- o Figures 3.4-2 are the photographs depicting the test site.
- o Figures 3.4-3 through 3.4-4 are the RF spectrum photographs depicting the interference environment at the test site.

TABLE 3.4-1

MEASUREMENT SITE DATA SHEET

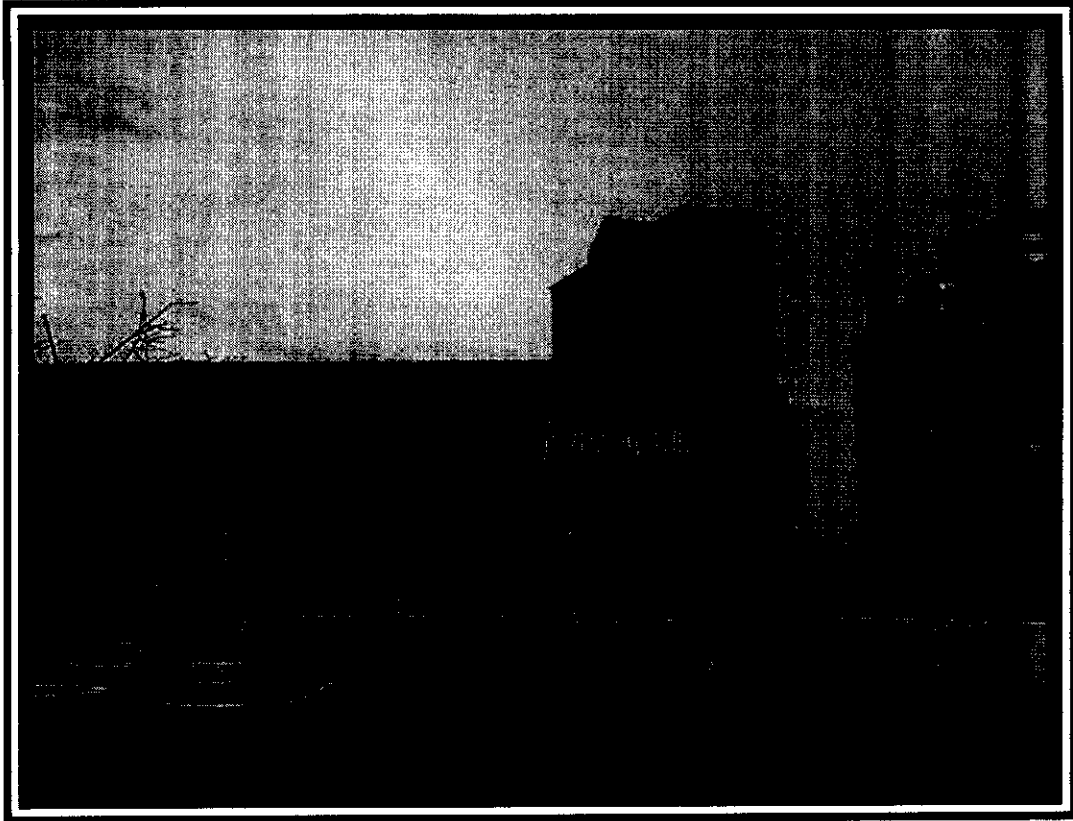
1. SYSTEM NAME:	XM Radio
2. CITY AND STATE:	Vienna, VA
3. SITE IDENTIFICATION:	Tyson's Corner
4. COORDINATES: (NAD 1983)	LATITUDE: 38° 55' 19.5" N LONGITUDE: 77° 13' 25.9" W
5. SITE TYPE:	Urban
6. MEASUREMENT DATES & TIMES:	January 17, 2002 1200-1330 January 18, 2002 1300-1400



XM RADIO
FIGURE 3.4-1



North



East

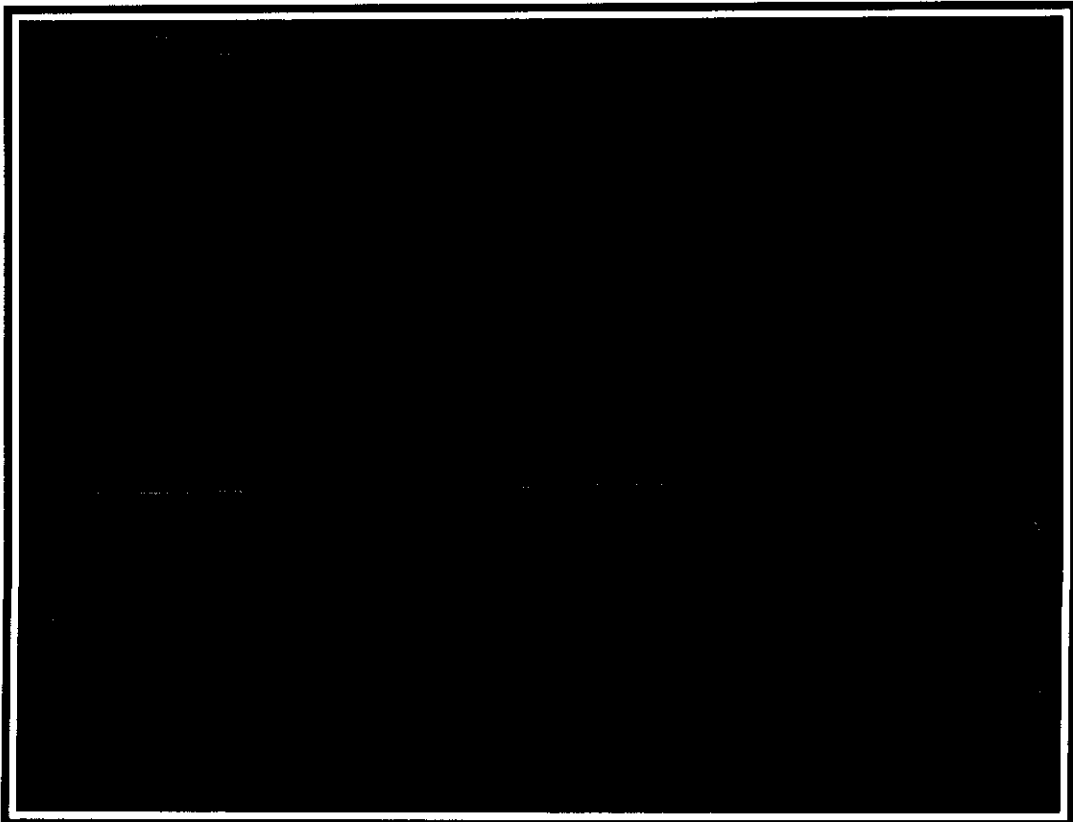


Figure 3.4-2 Measurement Site Photographs

South



West

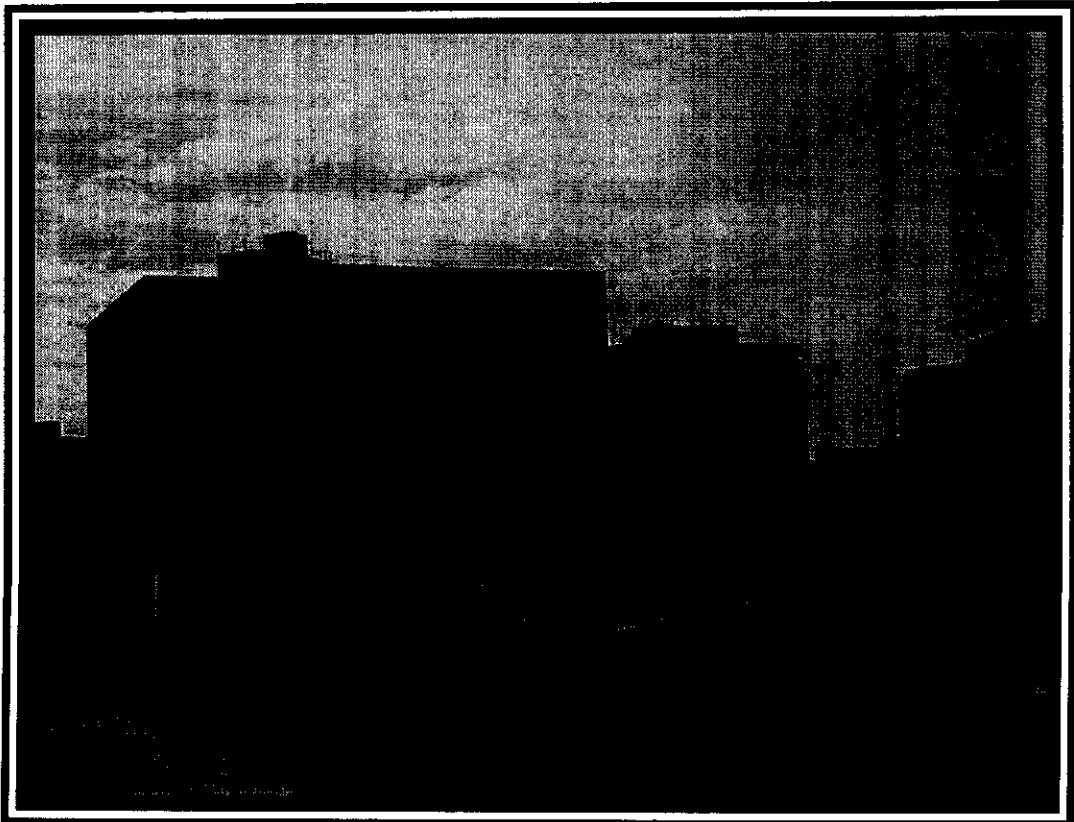
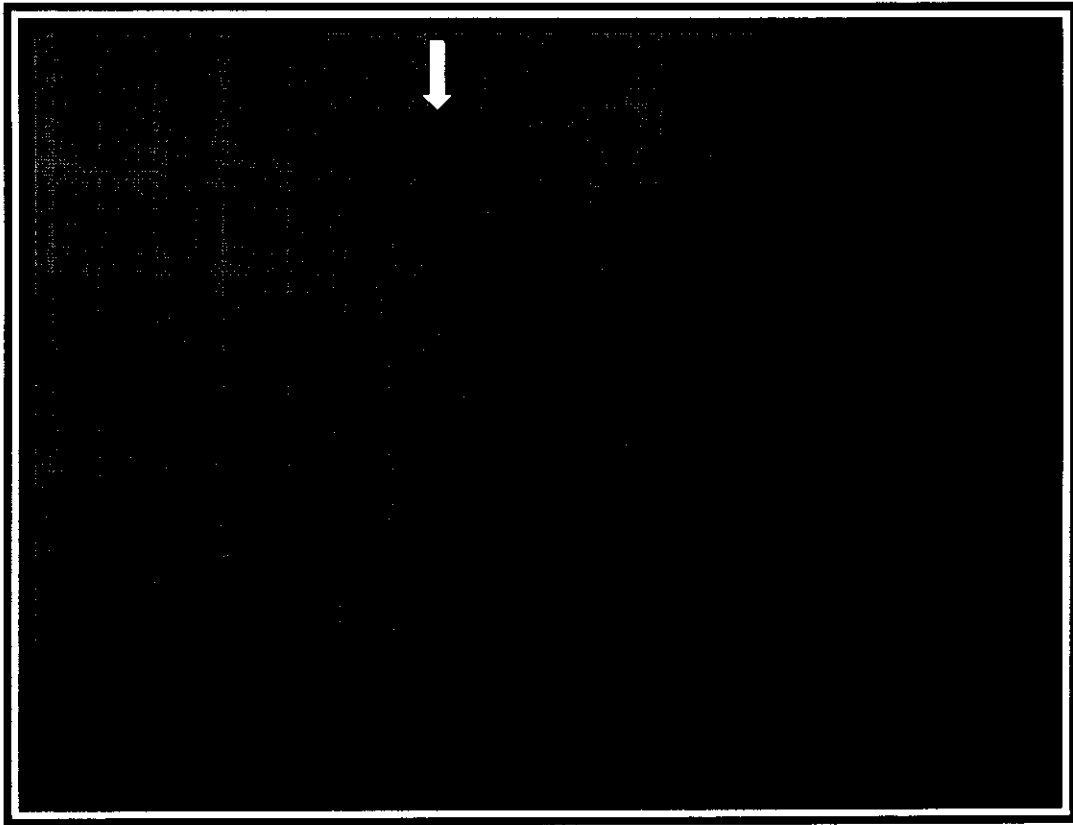


Figure 3.4-2 (cont.) Measurement Site Photographs

Az 233°



Az 296°

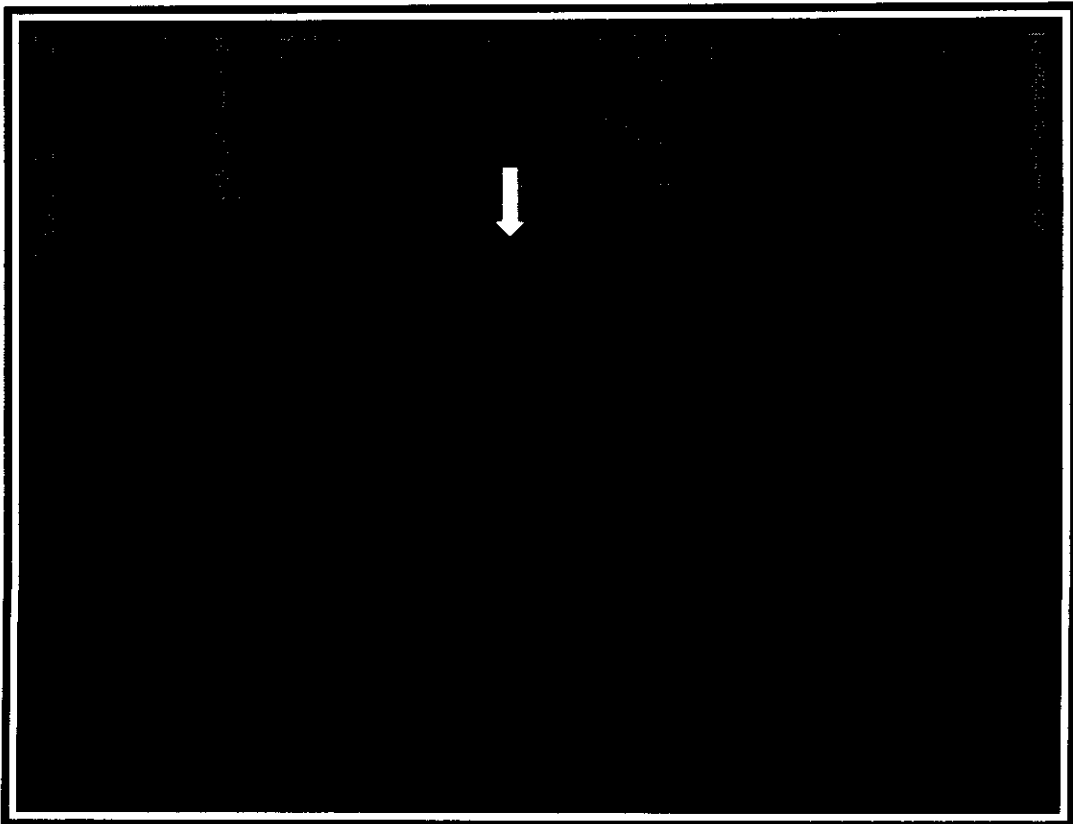


Figure 3.4-2 (cont.) Measurement Site Photographs

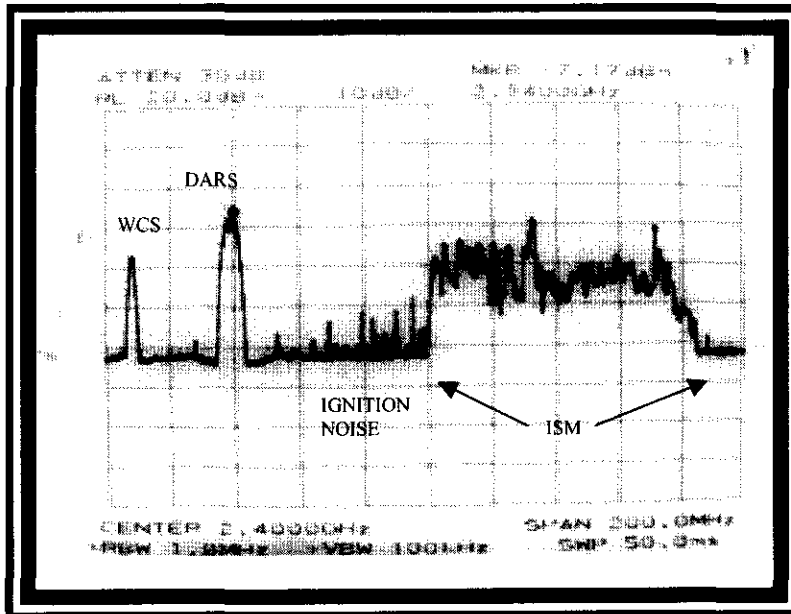
Vienna, Virginia

Azimuth 0-360°

Reference
Level
dBW_t

XM Radio

-87



With High-Pass, Tunable and
Notch Filters

Date: January 18, 2002

Time of Day: 1310

Ant. Polarization: V

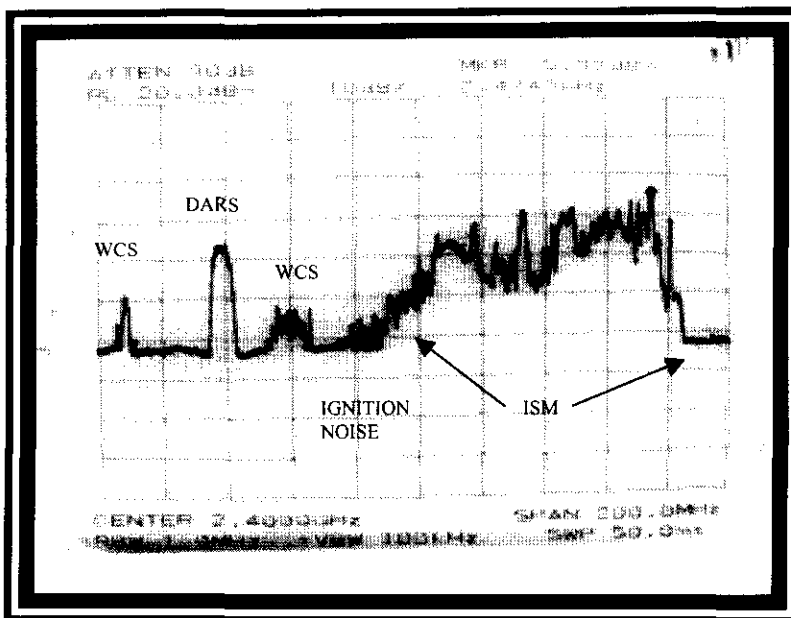
Ant. Centerline: 10 Ft.

Full Antenna Sweep

(A)

Reference
Level
dBW_t

-87



Date: January 18, 2002

Time of Day: 1315

Ant. Polarization: H

Ant. Centerline: 10 Ft.

Full Antenna Sweep

(B)

Figure 3.4-3 RF Spectrum Analysis

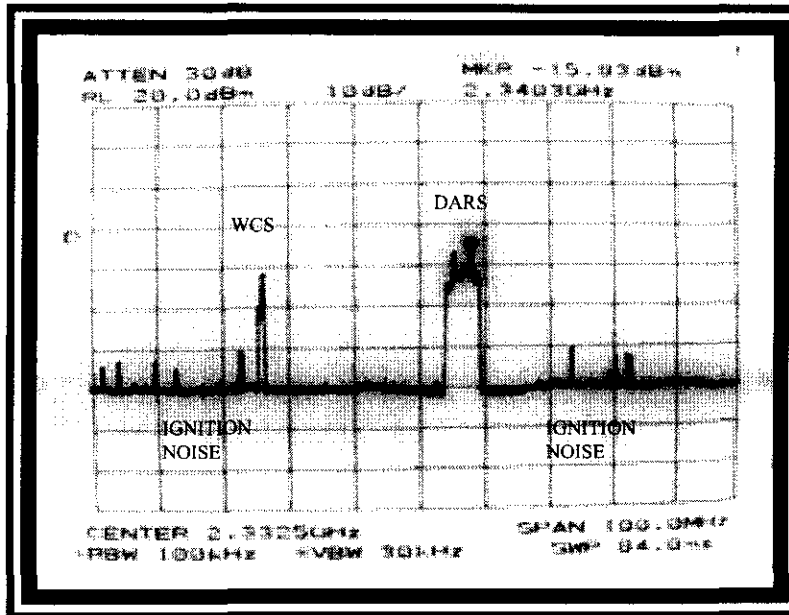
Vienna, Virginia

Reference
Level
dBW_i

XM Radio

Azimuth 0-360°

-87



With High-Pass, Tunable and
Notch Filters

Date: January 18, 2002

Time of Day: 1325

Ant. Polarization: V

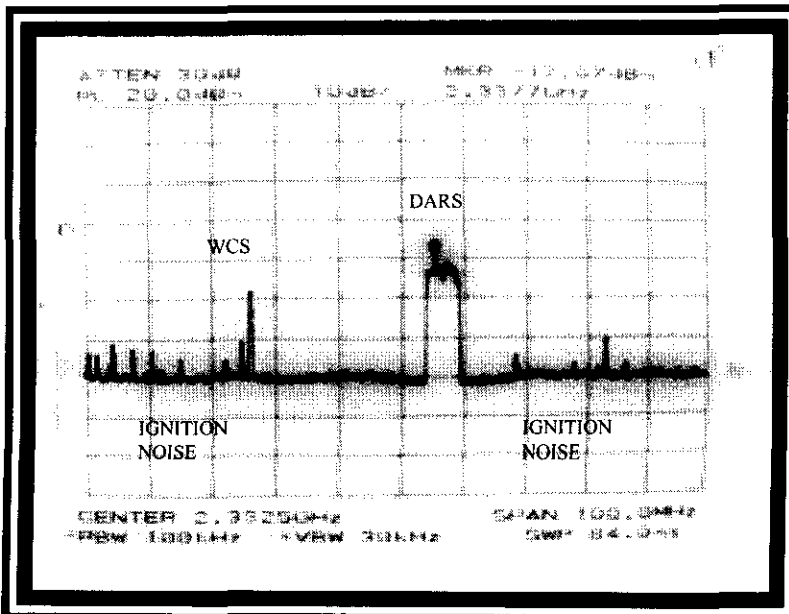
Ant. Centerline: 10 Ft.

Full Antenna Sweep

(A)

Reference
Level
dBW_i

-87



Date: January 18, 2002

Time of Day: 1330

Ant. Polarization: H

Ant. Centerline: 10 Ft.

Full Antenna Sweep

(B)

Figure 3.4-4 RF Spectrum Analysis